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| APPLICATION NO.                  | FILING DATE                                     |            | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO.     | CONFIRMATION NO. |
|----------------------------------|---|------------|----------------------|-------------------------|------------------|
| 09/753,227                       | 12/28/2000                                      |            | Darwin A. Engwer     | 3239P071                | 9335             |
| 8791                             | 7590  | 01/31/2003 |                      |                         |                  |
| BLAKELY SOKOLOFF TAYLOR & ZAFMAN |   |            |                      | EXAMINER                |                  |
|                                  | SHIRE BOULEVARD, SEVENTH FLOOR<br>LES, CA 90025 |            |                      | PHILPOTT, JUSTIN M      |                  |
|                                  |   |            |                      | ART UNIT                | PAPER NUMBER     |
|                                  |   |            |                      | 2665                    | $\overline{}$    |
|                                  |   |            |                      | DATE MAILED: 01/31/2003 | +                |

Please find below and/or attached an Office communication concerning this application or proceeding.

| •  | Application No.  | Applicant(s)   |  |  |  |  |  |
|--|--|--|--|--|--|--|--|
|  | 09/753,227   | ENGWER ET AL.  |  |  |  |  |  |
| Office Action Summary  | Examiner   | Art Unit   |  |  |  |  |  |
|  | Justin M Philpott  | 2665   |  |  |  |  |  |
| The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply   |  |  |  |  |  |  |  |
| A SHORTENED STATUTORY PERIOD FOR REPL' THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a repl If NO period for reply is specified above, the maximum statutory period Failure to reply within the set or extended period for reply will, by statute - Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).  Status | 36(a). In no event, however, may a reply be ti<br>y within the statutory minimum of thirty (30) da<br>will apply and will expire SIX (6) MONTHS fron<br>c. cause the application to become ABANDON | mely filed ys will be considered timely. n the mailing date of this communication. ED (35 U.S.C. § 133). |  |  |  |  |  |
| 1) Responsive to communication(s) filed on 17 i  | December 2002 .  |  |  |  |  |  |  |
| 2a) This action is <b>FINAL</b> . 2b)⊠ Th  | nis action is non-final.   |  |  |  |  |  |  |
| 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.   |  |  |  |  |  |  |  |
| Disposition of Claims  |  |  |  |  |  |  |  |
| 4) Claim(s) 1-23 is/are pending in the application.  |  |  |  |  |  |  |  |
| 4a) Of the above claim(s) is/are withdra   | wn from consideration.   |  |  |  |  |  |  |
| 5) Claim(s) is/are allowed.  |  |  |  |  |  |  |  |
| 6)⊠ Claim(s) <u>1-23</u> is/are rejected.  |  |  |  |  |  |  |  |
| 7) Claim(s) is/are objected to.  |  |  |  |  |  |  |  |
| 8) Claim(s) are subject to restriction and/or election requirement.  |  |  |  |  |  |  |  |
| Application Papers  OND The appointment is objected to by the Examiner   |  |  |  |  |  |  |  |
| 9) The specification is objected to by the Examiner.  10) The drawing(s) filed on <u>28 December 2000</u> is/are: a) accepted or b) dojected to by the Examiner.   |  |  |  |  |  |  |  |
| Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  |  |  |  |  |  |  |  |
| 11) The proposed drawing correction filed on is: a) approved b) disapproved by the Examiner.   |  |  |  |  |  |  |  |
| If approved, corrected drawings are required in reply to this Office action.   |  |  |  |  |  |  |  |
| 12) The oath or declaration is objected to by the Examiner.  |  |  |  |  |  |  |  |
| Priority under 35 U.S.C. §§ 119 and 120  |  |  |  |  |  |  |  |
| 13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  |  |  |  |  |  |  |  |
| a) ☐ All b) ☐ Some * c) ☐ None of:   |  |  |  |  |  |  |  |
| <ol> <li>Certified copies of the priority documen</li> </ol>   | ts have been received.   |  |  |  |  |  |  |
| 2. Certified copies of the priority documen  | ts have been received in Applica   | tion No  |  |  |  |  |  |
| 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received.   |  |  |  |  |  |  |  |
| 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).   |  |  |  |  |  |  |  |
| a) ☐ The translation of the foreign language provisional application has been received.  15) ☑ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.  |  |  |  |  |  |  |  |
| Attachment(s)  | p.10.11, 2.140. 00 0.010. 33 14  | · · · · · · · · · · · · · · · ·  |  |  |  |  |  |
| 1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449) Paper No(s)  | 5) Notice of Informa   | ary (PTO-413) Paper No(s) Il Patent Application (PTO-152)  |  |  |  |  |  |

U.S. Patent and Trademark Office PTO-326 (Rev. 04-01)

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#### **DETAILED ACTION**

### **Drawings**

- 1. Figures 1, 4 and 5 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.
- 2. The drawings are objected to because in Figure 10, the labels "TIM", "PRELIMINARY FCS 1050", "TEST PATTERN 1060" and "FCS 1070" should not be included in the range identified by the label "1010" in order to remain consistent with the specification. A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

## Claim Rejections - 35 USC § 112

- 3. The following is a quotation of the second paragraph of 35 U.S.C. 112:
  The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 4. Claims 8 and 14 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 8 recites the limitation "the access point" in claim 1. There is insufficient antecedent basis for this limitation in the claim. Applicant may overcome this rejection by amending the claim to be dependent upon claim 7, and not claim 1.

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Claim 14 recites the limitation "each traffic indication map" and "each delivery traffic indication message" in claim 10. There is insufficient antecedent basis for this limitation in the claim.

## Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (e) the invention was described in-
- (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effect under this subsection of a national application published under section 122(b) only if the international application designating the United States was published under Article 21(2)(a) of such treaty in the English language; or
- (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that a patent shall not be deemed filed in the United States for the purposes of this subsection based on the filing of an international application filed under the treaty defined in section 351(a).
- 6. Claims 1, 2, 4, 7-9 and 20-23 are rejected under 35 U.S.C. 102(e) as being anticipated by U.S. Patent No. 5,987,062 to Engwer et al.

Regarding claim 1, Engwer teaches broadcasting a special delivery traffic indication message beacon ("Short Beacon", see column 6, lines 19-38) and broadcasting a data frame ("Long Beacon") that includes at least load balancing information (see column 4, line 10 - column 5, line 11 regarding "load balancing").

Regarding claim 2, Engwer further teaches the special beacon (Short Beacon) includes a field having a traffic indicator bit that is set ("access point utilization value", see column 6, lines 19-33).

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Regarding claim 4, Engwer further teaches the data frame (Long Beacon) includes a test pattern (column 6, lines 20-21).

Regarding claim 7, Engwer further teaches broadcasting of both the special beacon (Short Beacon) and the data frame (Long Beacon) is performed by an access point ("AP", column 7, lines 34-36).

Regarding claim 8, Engwer further teaches the load balancing information (e.g., "MEFL", see column 3, line 56 - column 4, line 65) is computed from information pertaining to characteristics of wireless units ("mobile units (MU)") in communication with the access point (AP).

Regarding claim 9, Engwer further teaches the test pattern is a static bit pattern (see column 4, lines 29-31 regarding static, and see column 6, lines 39-40 regarding bit pattern).

Regarding claims 20 and 21, see the above regarding claims 1 and 4.

Regarding claim 22, see the above regarding claim 8.

Regarding claim 23, see the above regarding claim 9.

#### Claim Rejections - 35 USC § 103

- 7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

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8. Claims 3, 5 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Engwer.

Regarding claim 3, while Engwer does not specifically disclose broadcasting in accordance with IEEE 802.11, at the time of the invention configuring the special beacon in accordance with IEEE 802.11 would have been obvious to one of ordinary skill in the art because it is well known in the art that it is advantageous to configure a method to be in accordance with an industry standard such as IEEE 802.11 in order to achieve industry-wide acceptance and compatibility. Thus, it would have been obvious at the time of the invention to adapt the broadcasting method of Engwer to be compatible with an industry standard such as IEEE 802.11 in order to achieve industry-wide acceptance and compatibility.

Regarding claims 5 and 6, Engwer further teaches a broadcasting arrangement wherein the special beacon (Short Beacon) is broadcast every 7ms (column 7, lines 34-45) and the data frame (Long Beacon) is broadcast at the beginning of each frequency hop, e.g., every 100ms (see column 4, lines 26-27; column 6, lines 26-27; and column 7, lines 38-40). In such an arrangement, the time period between the end of the broadcast of the special beacon and the beginning of the next broadcast of the data frame is periodic, while each type of broadcast occurs at a fixed time in reference to the previous broadcast of the same type. Thus, a broadcast arrangement wherein the data frame is broadcast after a definitive time period has elapsed after, or immediately after, the broadcasting of the special beacon would have been obvious to one of ordinary skill in the art at the time of the invention because it is known in the art to replace a periodic time period between events with a fixed time period. Furthermore, broadcasting a particular frame after a fixed time period is known in the art for configuring a transmitter with a

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receiver and for providing improved accuracy in receiving transmission at the receiver, and thus, it would have been obvious to include fixed time periods with the method of Engwer.

9. Claims 10-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Engwer in view of IEEE Std. 802.11 (IEEE, August 1999).

Regarding claims 10 and 11, Engwer teaches the method as discussed above regarding claim 1, however, does not specifically disclose frame check sequences. IEEE 802.11 teaches frame check sequences for reasons known in the art such as maintaining signal integrity. Thus, applying frame check sequences to the teachings of Engwer would have been obvious to one of ordinary skill in the art at the time of the invention because it is well known in the art to utilize frame check sequences for reasons such as maintaining signal integrity and it is further commonly known that it is advantageous to configure methods to be in accordance with an industry standard, such as IEEE 802.11. Thus, at the time of the invention it would have been obvious to one of ordinary skill in the art to apply frame check sequences such as found in IEEE 802.11 to the method of Engwer in order to maintaining signal integrity and achieve industry-wide acceptance and compatibility.

Regarding claims 12-14, IEEE 802.11 further teaches utilizing a DTIM beacon, TIM beacon, and both DTIM and TIM beacons.

Regarding claims 15-17, see the above regarding claims 10 and 11.

Regarding claims 18 and 19, see the above regarding claims 12-14.

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#### **Conclusion**

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

U.S. Patent No. 6,330,231 to Bi discloses broadcasting load balancing information and traffic information for configuring wireless interface devices through access points (see particularly, col. 50, line 60 – col. 51, line 45; and col. 61, line 61 – col. 62, line 40).

Particularly, Bi discloses wireless access control which specifically conforms to the industry standard protocol in accordance with IEEE 802.11 (see col. 6, lines 13-18).

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Justin M Philpott whose telephone number is 703.305.7357. The examiner can normally be reached on M-F, 8:30am-5:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Huy D Vu can be reached on 703.308.6602. The fax phone numbers for the organization where this application or proceeding is assigned are 703.872.9314 for regular communications and 703.872.9314 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703.305.4750.

Justin M Philpott

January 17, 2003

SUPERVISORY PATENT EXAMINER

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